Civil Engineering Database Subject Heading Index

The **Civil Engineering Database (CEDB)** is designed to provide free, easy bibliographic access to all ASCE publications. The database covers ASCE documents published since 1970. It provides access to all the journals, conference proceedings, books, standards, manuals, magazines, and newspapers. The index terms below were assigned to papers published in this journal during 2005 from a CEDB subject heading list. The CEDB and subject heading list can be accessed on the Web at *http://www.pubs.asce.org/cedbsrch.html*.

Bench marks
Operations Benchmarking in the Fluidized Bed Power Generation Industry. —Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).

Bentonite
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. —Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Bottom ash
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. —Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Buildings, nonresidential
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. —Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

California
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. —Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Carbon
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Coal
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. — Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Combustion
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. — Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Computation
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. —Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).

Computer software
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).

Control methods
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. —Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).

Cost estimates
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. —Jorge F. Valenzuela; 131(2), 157-71 (2005).

Costs
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. — Jorge F. Valenzuela; 131(2), 157-71 (2005).
Decomposition
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).
Denmark
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).
Electric power demand
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).
Electric power output
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. — Jorge F. Valenzuela; 131(2), 157-71 (2005).
Electric power supply
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).
Combined Heat and Power as a Feature of Energypark. — Asfaw Beyene; 131(3), 173-88 (2005).
Electric transmission
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).
Energy
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. —Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).
Energy consumption
Combined Heat and Power as a Feature of Energypark. — Asfaw Beyene; 131(3), 173-88 (2005).
Environmental issues
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).
Financial management
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).
Finland
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).
Fluidized beds
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).
Fly ash
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. —Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).
Grid systems
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. —Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).
Hydroelectric power generation
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. —Magnus Hindsberger; 131(2), 98-117 (2005).
Hydroelectric powerplants
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. —Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).
Industrial plants
Combined Heat and Power as a Feature of Energypark. — Asfaw Beyene; 131(3), 173-88 (2005).

Inflow
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. — Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).

Investments
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).

Monte Carlo method
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. — Jorge F. Valenzuela; 131(2), 157-71 (2005).

Norway
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. —Magnus Hindsberger; 131(2), 98-117 (2005).

Optimization
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. —Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).
Combined Heat and Power as a Feature of Energypark. — Asfaw Beyene; 131(3), 173-88 (2005).

Precipitation
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. —Magnus Hindsberger; 131(2), 98-117 (2005).

Pricing
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).

Probability distribution
Impact of Market Uncertainty on Congestion Revenue Right Valuation. —Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. — Jorge F. Valenzuela; 131(2), 157-71 (2005).

Reservoirs
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. — Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).

Revenues
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).

Scheduling
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).

Shear strength
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. —Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Simulation
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).

Stiffness
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. —Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Stochastic models
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. —Magnus Hindsberger; 131(2), 98-117 (2005).

Sweden
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. —Magnus Hindsberger; 131(2), 98-117 (2005).

Tidal electric power generation
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).

Turkey

Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).

Utilities

Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Author Index

Arora, G.
Discussion of "Permeability and Consolidation Characteristics of Compacted Fly Ash" by Shenbaga R. Kaniraj and V. Gayathri. — A. Trivedi, R. Pathak, and G. Arora; 131(3), 208-10 (2005).

Beavers, Harvie
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).

Beyene, Asfaw
Combined Heat and Power as a Feature of Energypark. — Asfaw Beyene; 131(3), 173-88 (2005).

Boukhtouta, Abdeslem
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. — Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).

Conejo, Antonio J.
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).

de la Torre, Sebastián
Optimal Self-Scheduling of a Tidal Power Plant. — Sebastián de la Torre and Antonio J. Conejo; 131(1), 26-51 (2005).

Deng, Shi-Jie
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).

Edwards, Jennifer L.
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Firestone, Ryan
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Fuller, Jack A.
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).

Gampala, Kiran
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).

Gayathri, V.
Closure to "Permeability and Consolidation Characteristics of Compacted Fly Ash" by Shenbaga R. Kaniraj and V. Gayathri. — Shenbaga R. Kaniraj and V. Gayathri; 131(3), 211-2 (2005).

Ghosh, Srijay
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Hindsberger, Magnus
Modeling a Hydrothermal System with Hydro- and Snow Reservoirs. — Magnus Hindsberger; 131(2), 98-117 (2005).

Kaniraj, Shenbaga R.
Closure to "Permeability and Consolidation Characteristics of Compacted Fly Ash" by Shenbaga R. Kaniraj and V. Gayathri. — Shenbaga R. Kaniraj and V. Gayathri; 131(3), 211-2 (2005).

Kumar, Sanjeev
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. — Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Lamond, Bernard F.
Neural Approximation for the Optimal Control of a Hydroplant with Random Inflows and Concave Revenues. — Bernard F. Lamond and Abdeslem Boukhtouta; 131(1), 72-95 (2005).

Li, Zuyi
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).

Lu, Bo
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).

Marnay, Chris
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Özdamar, Linet
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).

Pathak, R.
Discussion of "Permeability and Consolidation Characteristics of Compacted Fly Ash" by Shenbaga R. Kaniraj and V. Gayathri. — A. Trivedi, R. Pathak, and G. Arora; 131(3), 208-10 (2005).

Pokharel, Shaligram
Investment Model for Power Generation and Transmission Network Expansion in Turkey. — Kiran Gampala, Linet Özdamar, and Shaligram Pokharel; 131(2), 118-38 (2005).

Sakis Meliopoulos, A. P.
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).

Shahidehpour, Mohammad
Impact of Phase Shifters on Locational Prices. — Bo Lu, Zuyi Li, and Mohammad Shahidehpour; 131(1), 52-71 (2005).

Siddiqui, Afzal S.
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Srivastava, Abhishek
Operations Benchmarking in the Fluidized Bed Power Generation Industry. — Jack A. Fuller, Abhishek Srivastava, and Harvie Beavers; 131(3), 189-97 (2005).

Stadler, Michael
Effects of Carbon Tax on Microgrid Combined Heat and Power Adoption. — Afzal S. Siddiqui, Chris Marnay, Jennifer L. Edwards, Ryan Firestone, Srijay Ghosh, and Michael Stadler; 131(1), 2-25 (2005).

Sun, Haibin
Impact of Market Uncertainty on Congestion Revenue Right Valuation. — Haibin Sun, Shi-Jie Deng, and A. P. Sakis Meliopoulos; 131(2), 139-56 (2005).

Trivedi, A.
Discussion of "Permeability and Consolidation Characteristics of Compacted Fly Ash" by Shenbaga R. Kaniraj and V. Gayathri. — A. Trivedi, R. Pathak, and G. Arora; 131(3), 208-10 (2005).

Tseng, Chung-Li
New Modeling Tools for Energy Systems. — Chung-Li Tseng; 131(1), 1 (2005).
New Modeling Tools for Energy Markets. — Chung-Li Tseng; 131(2), 97 (2005).

Vaddu, Prashanth
Improvement in Strength and Moduli of Coal Ash Stabilized with Bentonite and Compacted at Various Unit Weights. — Sanjeev Kumar and Prashanth Vaddu; 131(3), 198-207 (2005).

Valenzuela, Jorge F.
Analytical Approximation to the Probability Distribution of Electricity Marginal Production Costs. — Jorge F. Valenzuela; 131(2), 157-71 (2005).